Title (en)

Circuit breaker with input load increasing means

Title (de)

Schutzschalter mit Eingangslasterhöhungsmitteln

Title (fr)

Disjoncteur avec supports d'augmentation de charge d'entrée

Publication

EP 2874172 A1 20150520 (EN)

Application

EP 14191195 A 20141031

Priority

KR 20130140834 A 20131119

Abstract (en)

A circuit breaker comprises a switching mechanism that including a linkage with a drive joint that is mounted to be rotatable around a rotation axis by a driving force, wherein, during the ON operation, an axis formed by the rotation axis and the point of action of the driving force makes an acute angle with the line of action of the driving force, so that the drive joint causes the tangential force of the driving force to act as input load, at least one hinge part of the linkage is configured in a way that the connecting pin is movably hinged to the long hole-shaped hinge hole, and at least one hinge part of the linkage causes the tangential force to increase by changes in the acute angle as the connecting pin moves from a first side of the long hole-shaped hinge hole to a second side.

IPC 8 full level

H01H 71/52 (2006.01)

CPC (source: CN EP KR US)

H01H 71/0207 (2013.01 - KR US); **H01H 71/12** (2013.01 - KR); **H01H 71/2472** (2013.01 - KR US); **H01H 71/525** (2013.01 - CN EP KR US)

Citation (search report)

- [XA] EP 2654064 A1 20131023 - MITSUBISHI ELECTRIC CORP [JP]
- [A] GB 1288716 A 19720913

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

EP 2874172 A1 20150520; **EP 2874172 B1 20160713**; BR 102014028741 A2 20150908; BR 102014028741 B1 20211123; CN 104658822 A 20150527; CN 104658822 B 20170104; ES 2596412 T3 20170109; IN 3243DE2014 A 20150821; JP 2015099780 A 20150528; JP 5883108 B2 20160309; KR 101447042 B1 20141006; US 2015137916 A1 20150521; US 9449776 B2 20160920

DOCDB simple family (application)

EP 14191195 A 20141031; BR 102014028741 A 20141118; CN 201410665075 A 20141119; ES 14191195 T 20141031; IN 3243DE2014 A 20141110; JP 2014234602 A 20141119; KR 20130140834 A 20131119; US 201414528933 A 20141030